

## Patent Abstracts of Japan

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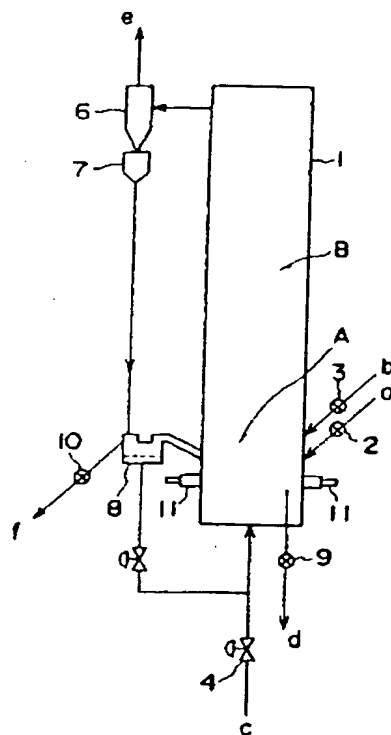
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TITLE : PREREDUCTION OF IRON ORE



**ABSTRACT :** **PURPOSE:** To prevent formation of angular hard half-reduced ore and to improve the durability of pipings, tuyeres, etc., by providing a high-temp. part within a fluidized bed prereluction furnace and passing ore raw materials through the high-temp. part.

**CONSTITUTION:** A heating mechanism 11 is provided to the lower part of the fluidized bed prereluction furnace 1 and the locally high-temp. part A is provided thereto. The high-temp. part A is maintained at the temp. higher by about 300-600°C than the temp. in a free board part B which occupies the greater part in the furnace 1. The powdery raw materials of the iron ore and/or half-reduced iron ore are passed in said high-temp. part A. The powdery iron ore is thereby subjected to a high temp. treatment to form the half-reduced ore contg. soft wustite and metal iron. The generation of wear in the piping system for feeding said half-reduced ore to a smelting reduction furnace is, therefore, suppressed and the maintenance of the piping system is facilitated.

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